

## 6. DOCTOR-DIAGNOSED ARTHRITIS

**Measure Definition:** *“Have you ever been told by a doctor or other health professional that you have some form of arthritis, rheumatoid arthritis, gout, lupus, or fibromyalgia?” [Yes]*

### Why is arthritis important to public health?

In 2002, an estimated 42.7 million, or 20.8% of U.S. adults aged 18 years and older reported arthritis. Women had a higher prevalence of arthritis (24.3%) than men (17.1%). Prevalence among all respondents increased with age. One in three U.S. adults with arthritis (37.6%) reported activity limitations caused by arthritis or joint symptoms, which equals 7.8% or 16 million U.S. adults. Nearly one in four adults with arthritis (24.6%) reported severe joint pain during the preceding 30 days. Among persons 18–64 years of age with arthritis, 30.6% or 8.2 million adults reported limitations at work which were caused by arthritis.<sup>12</sup>

Arthritis also results in a substantial burden to the U.S. health care system. Each year, arthritis results in 750,000 hospitalizations and 36 million outpatient visits. The total cost of arthritis and other related conditions in the United States in 1997 was \$86.2 billion (including \$51.1 billion in direct costs and \$35.1 billion in indirect costs), which was approximately 1% of the 1997 U.S. gross domestic product.<sup>13</sup>

### Risk factors for arthritis

Certain factors have been shown to be associated with a greater risk of arthritis. Some of these risk factors are modifiable while others are not. Non-modifiable risk factors include age, gender, and genetics. The risk of developing arthritis increases with age. Most types of arthritis are more common in women. Genes have been identified that are associated with a higher risk of certain types of arthritis, such as rheumatoid arthritis and systemic lupus erythematosus. Modifiable risk factors include overweight or obesity, joint injuries, infection, and occupation. Excess weight can contribute to both the onset and progression of knee osteoarthritis. Damage to a joint can contribute to the development of osteoarthritis of that joint. Many microbial agents can infect joints and may cause various forms of arthritis. Certain occupations involving repetitive knee bending are associated with osteoarthritis of the knee.

### Arthritis in Utah

The age-adjusted prevalence rate of arthritis in Utah using the aggregated 2001–2005 data was 24.8% of the population aged 18 and older. The crude rate was 21.8%, meaning that in 2003, approximately 361,000 Utah adults reported arthritis. The age-adjusted U.S. rate of 25.6% was slightly higher than the Utah rate.

After adjusting for age, Central Utah and Weber-Morgan health districts had a higher prevalence of arthritis (30.6% and 27.7% respectively) compared to the state rate. The age-adjusted prevalence of arthritis in Utah’s local health districts ranged from a low of 20.6% in Summit County to a high of 30.6% in Central Utah.

Within the local health districts there were small areas with higher and lower prevalence rates of arthritis relative to the age-adjusted state rate. For example, adults living in Juab, Millard, and Sanpete Counties, North Orem, and Ben Lomond reported a higher prevalence of arthritis than the state rate. Adults living in Southeast Sandy and Alpine/American Fork reported a lower prevalence of arthritis compared to the state rate. Overall, the small area with the highest prevalence of arthritis was North Orem (36.1%), and the small area with the lowest prevalence of arthritis was Alpine/American Fork, with a rate of 15.1%.

**Utah Objective:** Same as HP2010 objective.

**HP2010 Objective (related) 2-7:** (Developmental) Increase the proportion of adults who have seen a health care provider for their chronic joint symptoms.

## 6. DOCTOR-DIAGNOSED ARTHRITIS

### Prevention/Resources

The Utah/Idaho Chapter of the Arthritis Foundation offers the following programs to improve quality of life and general health status:

Arthritis Foundation Aquatics Program – This program uses exercises that are performed while standing in a warm water pool. The water provides resistance to build muscle strength and supports joints to encourage free movement.

Arthritis Foundation Exercise Program – This program uses low-impact exercises created by physical therapists that can be performed while standing or sitting. The exercises use gentle range-of-motion movements suitable for any fitness level.

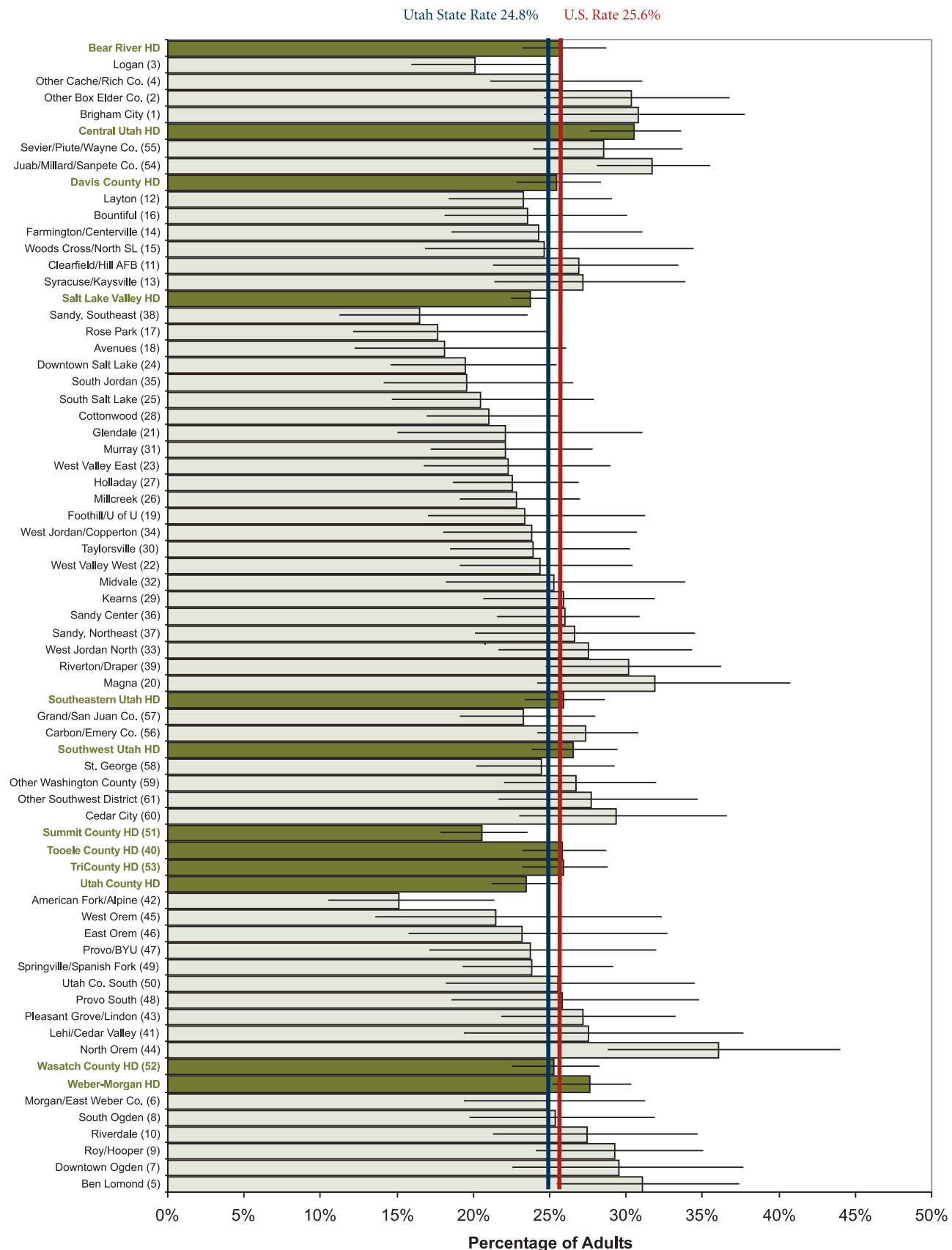
Arthritis Foundation Self-Help Program – This six-week program teaches participants about joint anatomy and protecting joints, the importance of exercise and nutrition, how to take medications properly, and to communicate better with their doctor.

Other resources include local orthopedic clinics, local health departments, Salt Lake County Aging Services, the Utah Division of Aging and Adult Services, the Department of Veterans Affairs Medical Center, the Department of Rheumatology at the University of Utah School of Medicine, and the Centers for Disease Control and Prevention.

For more information about arthritis contact the Utah Department of Health Arthritis Program at (801) 538-9458 or <http://health.utah.gov/arthritis/>.

## 6. DOCTOR-DIAGNOSED ARTHRITIS

Figure 6.1: Percentage of Adults Reporting Doctor-diagnosed Arthritis by Local Health District and Small Area, Utah Adults Aged 18+, 2001–2003, 2005 (Age-adjusted)



## 6. DOCTOR-DIAGNOSED ARTHRITIS

Table 6: Dr. Dx Arthritis by Health District, Small Area, Utah, and U.S., 2001-2003, 2005

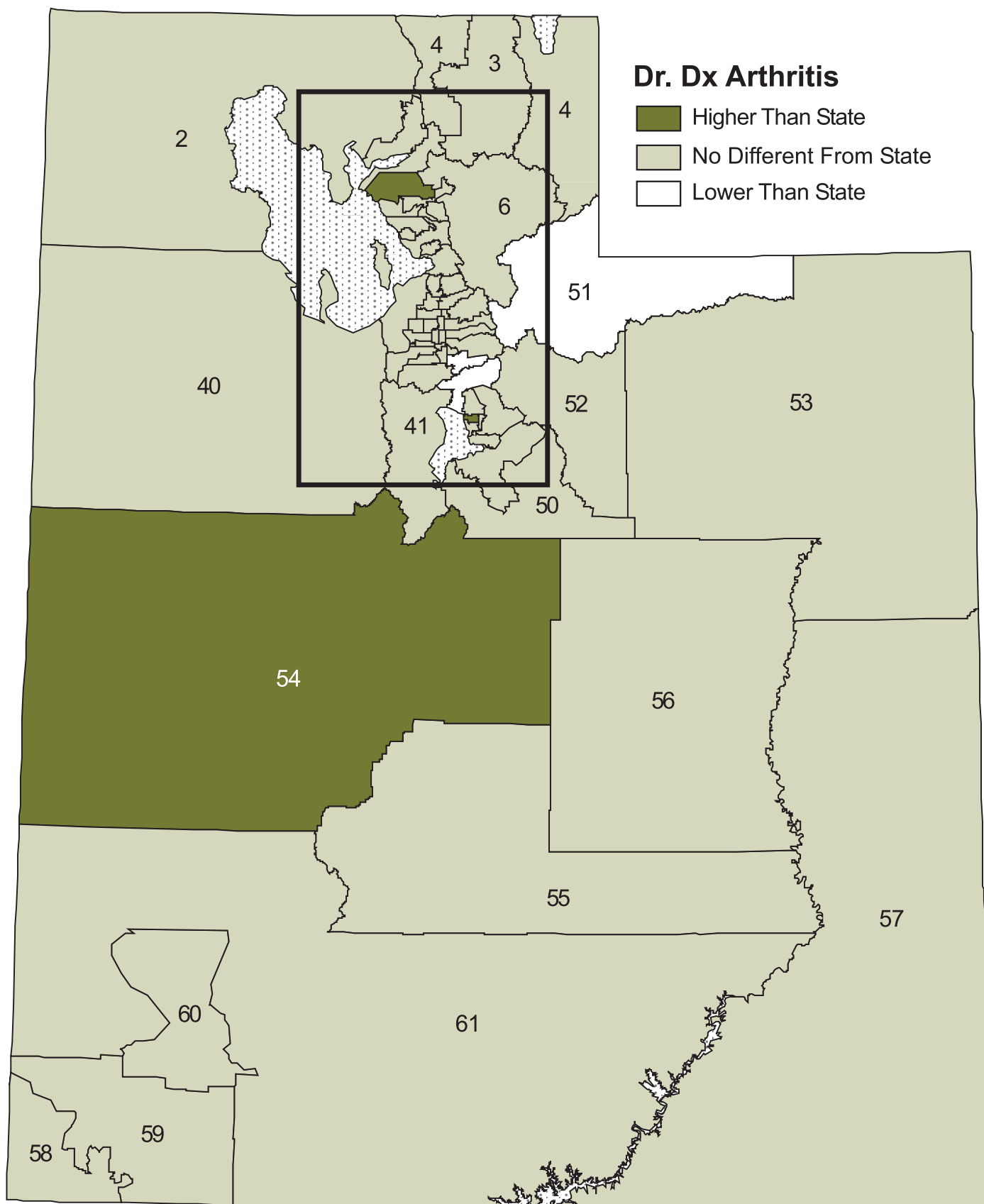
State Rank*	State, Health District, or Small Area	2003 Population 18+	Number of Adults With Dr. Dx Arthritis	Crude Rate	Age-adjusted Rate	95% Confidence Interval	
						Lower	Upper
	U.S.	217,803,051	56,672,354	26.0%	25.6%	25.5%	25.8%
	State of Utah	1,657,454	361,656	21.8%	24.8%	24.1%	25.6%
	<b>Bear River HD</b>	98,027	20,919	21.3%	25.9%	23.2%	28.7%
57	Brigham City (1)	14,566	4,100	28.2%	30.8%	24.7%	37.8%
7	Logan (3)	45,904	6,165	13.4%	20.1%	15.9%	25.1%
56	Other Box Elder Co. (2)	14,636	4,482	30.6%	30.4%	24.6%	36.8%
35	Other Cache/Rich Co. (4)	22,921	5,437	23.7%	25.8%	21.1%	31.1%
	<b>Central Utah HD</b>	47,558	14,377	30.2%	30.6%	27.7%	33.7%
59	Juab/Millard/Sanpete Co. (54)	31,637	9,640	30.5%	31.7%	28.1%	35.5%
51	Sevier/Piute/Wayne Co. (55)	15,921	4,744	29.8%	28.6%	23.9%	33.7%
	<b>Davis County HD</b>	175,027	39,609	22.6%	25.4%	22.8%	28.3%
21	Bountiful (16)	33,318	7,760	23.3%	23.5%	18.1%	30.0%
43	Clearfield/Hill AFB (11)	37,329	7,959	21.3%	26.9%	21.3%	33.4%
26	Farmington/Centerville (14)	19,034	4,608	24.2%	24.3%	18.6%	31.1%
19	Layton (12)	46,815	9,794	20.9%	23.3%	18.4%	29.1%
44	Syracuse/Kaysville (13)	24,542	5,686	23.2%	27.2%	21.4%	33.9%
29	Woods Cross/North SL (15)	13,989	3,480	24.9%	24.6%	16.9%	34.4%
	<b>Salt Lake Valley HD</b>	658,810	137,098	20.8%	23.7%	22.5%	25.0%
4	Avenues (18)	18,959	3,181	16.8%	18.1%	12.2%	26.1%
10	Cottonwood (28)	33,297	7,695	23.1%	21.0%	16.9%	25.8%
5	Downtown Salt Lake (24)	42,808	6,781	15.8%	19.4%	14.6%	25.4%
20	Foothill/U of U (19)	17,778	3,975	22.4%	23.4%	17.0%	31.3%
12	Glendale (21)	18,642	2,999	16.1%	22.1%	15.1%	31.1%
15	Holladay (27)	35,956	10,258	28.5%	22.5%	18.6%	26.9%
38	Kearns (29)	42,995	8,307	19.3%	25.9%	20.6%	31.9%
60	Magna (20)	15,623	4,243	27.2%	31.9%	24.2%	40.8%
31	Midvale (32)	21,672	4,129	19.1%	25.2%	18.2%	33.9%
16	Millcreek (26)	44,008	10,989	25.0%	22.8%	19.2%	27.0%
13	Murray (31)	24,072	5,455	22.7%	22.1%	17.2%	27.8%
55	Riverton/Drapers (39)	41,391	9,032	21.8%	30.2%	24.7%	36.3%
3	Rose Park (17)	22,639	3,663	16.2%	17.7%	12.2%	25.0%
40	Sandy Center (36)	36,106	7,066	19.6%	26.0%	21.6%	30.9%
41	Sandy, Northeast (37)	18,245	4,766	26.1%	26.7%	20.1%	34.5%
2	Sandy, Southeast (38)	20,781	3,157	15.2%	16.5%	11.3%	23.5%
6	South Jordan (35)	20,931	3,196	15.3%	19.6%	14.1%	26.5%
8	South Salt Lake (25)	18,456	3,700	20.1%	20.5%	14.7%	27.9%
25	Taylorsville (30)	27,372	5,729	20.9%	23.9%	18.5%	30.3%
48	West Jordan North (33)	30,391	6,051	19.9%	27.5%	21.6%	34.3%
23	West Jordan/Copperton (34)	26,360	4,827	18.3%	23.8%	18.0%	30.7%
14	West Valley East (23)	35,527	7,599	21.4%	22.3%	16.8%	29.0%
27	West Valley West (22)	44,794	9,165	20.5%	24.3%	19.1%	30.4%
	<b>Southeastern Utah HD</b>	36,828	9,336	25.4%	25.9%	23.3%	28.6%
46	Carbon/Emery Co. (56)	21,451	5,813	27.1%	27.4%	24.2%	30.8%
18	Grand/San Juan Co. (57)	15,377	3,364	21.9%	23.2%	19.1%	28.0%
	<b>Southwest Utah HD</b>	116,150	31,593	27.2%	26.5%	23.9%	29.4%
53	Cedar City (60)	22,401	5,038	22.5%	29.3%	23.0%	36.6%
50	Other Southwest District (61)	15,384	5,101	33.2%	27.7%	21.6%	34.7%
42	Other Washington County (59)	32,503	8,532	26.3%	26.7%	22.0%	32.0%
28	St. George (58)	45,862	12,337	26.9%	24.4%	20.2%	29.2%
9	<b>Summit County HD (51)</b>	24,525	4,449	18.1%	20.6%	17.9%	23.5%
37	<b>Tooele County HD (40)</b>	32,458	7,342	22.6%	25.9%	23.2%	28.7%
39	<b>TriCounty HD (53)</b>	28,023	7,042	25.1%	25.9%	23.2%	28.8%
	<b>Utah County HD</b>	278,832	48,489	17.4%	23.6%	21.4%	26.0%
1	American Fork/Alpine (42)	26,819	3,427	12.8%	15.1%	10.5%	21.4%
17	East Orem (46)	14,955	2,665	17.8%	23.2%	15.8%	32.7%
49	Lehi/Cedar Valley (41)	18,752	3,298	17.6%	27.6%	19.3%	37.7%
61	North Orem (44)	25,965	6,733	25.9%	36.1%	28.8%	44.0%
45	Pleasant Grove/Lindon (43)	24,636	4,654	18.9%	27.2%	21.9%	33.3%
22	Provo/BYU (47)	39,401	6,434	16.3%	23.7%	17.1%	32.0%
36	Provo South (48)	48,138	4,718	9.8%	25.8%	18.5%	34.8%
24	Springville/Spanish Fork (49)	41,036	8,654	21.1%	23.9%	19.3%	29.2%
34	Utah Co. South (50)	17,363	3,306	19.0%	25.5%	18.2%	34.5%
11	West Orem (45)	21,774	4,091	18.8%	21.5%	13.6%	32.3%
32	<b>Wasatch County HD (52)</b>	12,514	2,922	23.4%	25.3%	22.5%	28.3%
	<b>Weber-Morgan HD</b>	148,702	38,187	25.7%	27.7%	25.2%	30.4%
58	Ben Lomond (5)	33,215	9,134	27.5%	31.1%	25.5%	37.4%
54	Downtown Ogden (7)	21,684	6,067	28.0%	29.5%	22.5%	37.7%
30	Morgan/East Weber Co. (6)	24,131	5,799	24.0%	24.8%	19.4%	31.3%
47	Riverdale (10)	15,522	4,092	26.4%	27.5%	21.3%	34.7%
52	Roy/Hooper (9)	27,898	6,799	24.4%	29.2%	24.1%	35.0%
33	South Ogden (8)	26,255	6,440	24.5%	25.4%	19.8%	31.9%

\*State rank is by 61 small areas for age-adjusted rate; 1 is always the lowest rate in the state and 61 is always the highest rate in the state.

Note: U.S. rate only includes data from 2001–2004.

## 6. DOCTOR-DIAGNOSED ARTHRITIS

Figure 6.2: Dr. Dx Arthritis by Small Area, Utah Adults Aged 18+, 2001–2003, 2005 (Age-adjusted)



## 6. DOCTOR-DIAGNOSED ARTHRITIS

Figure 6.3: Dr. Dx Arthritis by Small Area, Wasatch Front Adults Aged 18+, 2001–2003, 2005 (Age-adjusted)

